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Amendments to the Claims:

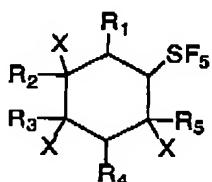
This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

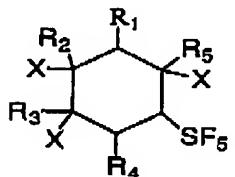
1. (Currently Amended) A process for making pentafluorosulfuranyl arylene which comprises:

effecting dehydrohalogenation or dehydrogenation of a halogenated pentafluorosulfuranyl cycloaliphatic compound represented by either of the structures:

A



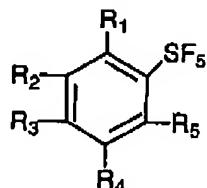
B



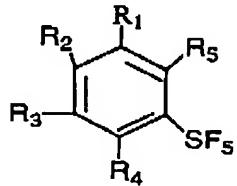
or

to form pentafluorosulfuranyl arylene compounds represented by either of the structures:

C



D



or

wherein R₁₋₅ are H, halogen, e.g., Cl, or Br, C₁₋₁₀ alkyl, C₁₋₁₀ alkoxy, C₁₋₁₀ thionyl, C₁₋₁₀ alkyl ether, aryl and substituted aryl, thioether, sulfonyl, carboalkoxy, alkylamino, arylamino, alkylphosphoryl, alkylphosphonyl, aryloxyphosphoryl, aryloxyphosphonyl, and arylphosphoryl etc and mixtures thereof and X is a halogen atom.

2. (Original) The process of Claim 1 wherein R₁₋₅ are H.

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3. (Original) The process of Claim 2 wherein X is selected from the group consisting of Br and Cl or a mixture thereof.

4. (Original) The process of Claim 3 wherein compounds C and D are formed by effecting dehydrohalogenation of compounds represented by the structures A or B.

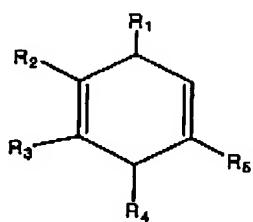
5. (Original) The process of Claim 4 wherein X is bromine.

6. (Currently Amended) The process of Claim 5 wherein dehydrohalogenation is effected by reaction of compounds represented by the structures represented by the structures A and B with powdered- sodium hydroxide.

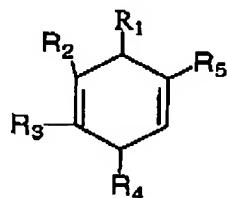
7. (Currently Amended) The process of Claim 1 wherein the halogenated pentafluorosulfuranyl cycloaliphatic compounds for forming the pentafluorosulfuranyl arlenes are formed by a two step process which comprises:

(a) reacting SF₅X with a compound represented by either of the structures:

E



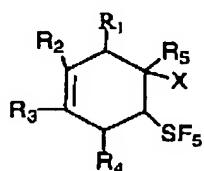
F



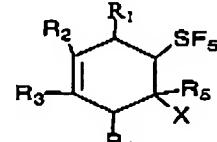
or

leading to the formation of compounds represented by either of the structures:

I



J



or

wherein R₁₋₅ are H, halogen, e.g., Cl, or Br; C₁₋₁₀ alkyl, C₁₋₁₀ alkoxy, C₁₋₁₀ thionyl, C₁₋₁₀ alkyl ether, aryl and substituted aryl, thioether, sulfonyl, carboalkoxy, alkylamino, arylamino,

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alkylphosphoryl, alkylphosphonyl, arylpheyonyl, arylphosphonyl, and arylphosphoryl etc and mixtures thereof and X is Br or Cl.

and then,

(b) halogenating the thus formed compounds represented by the structures I and J produced in step (a) by reaction with Cl₂, Br₂, or I₂ to form the halogenated pentafluorosulfuranyl cycloaliphatic compounds represented by the structures A and B.

8. (Original) The process of Claim 7 wherein R₁₋₅ are H.

9. (Original) The process of Claim 8 wherein step (a) is carried out using SF₅Br as the reactant.

10. (Original) The process of Claim 9 wherein a free radical initiator is used to catalyze the reaction of SF₅Br with compound represented by the structures E or F.

11. (Original) The process of Claim 10 wherein the free radical initiator is triethyl borane.

12. (Original) The process of Claim 11 wherein halogenation in step (b) is carried out using Br₂ as the halogenating agent.

13. (Original) The process of Claim 12 wherein compounds represented by the structures C and D are formed by effecting dehydrohalogenation of compounds represented by the structures A and B by reaction with powdered sodium hydroxide.

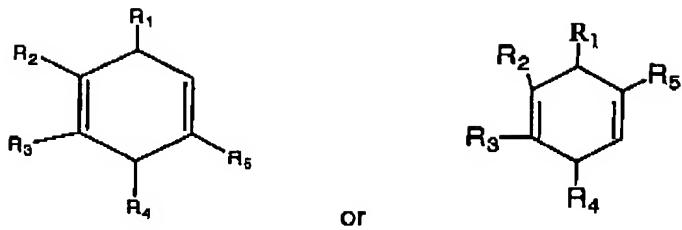
14. (Currently Amended) The process of Claim 1 wherein the halogenated pentafluorosulfuranyl cycloaliphatic compounds for forming the pentafluorosulfuranyl arylenes are formed by a two step process which comprises:

(a) halogenating a compound represented by the structures:

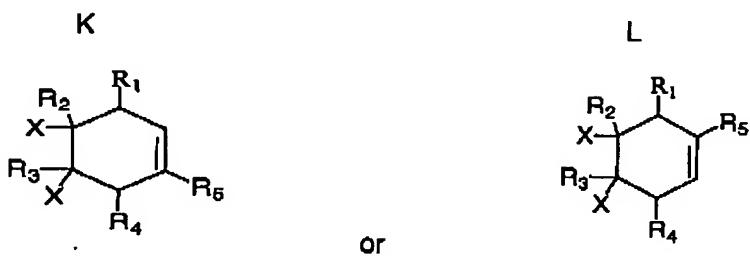
E

F

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leading to the formation of compounds represented by the structures:



wherein R_{1-5} are H, halogen, e.g., Cl, or Br, C_{1-10} alkyl, C_{1-10} alkoxy, C_{1-10} thionyl, C_{1-10} alkyl ether, aryl and substituted aryl, thioether, sulfonyl, carboalkoxy, alkylamino, arylamino, alkylphosphoryl, alkylphosphonyl, arylpheyonyl, arylpheophonyl, and arylpheophonyl etc and mixtures thereof and X is Br or Cl.

and then,

(b) reacting the thus formed compounds K and L produced in step (a) by reaction with SF_5X to produce compounds represented by the structures A or B.

15. (Original) The process of Claim 14 wherein R_{1-5} are H and X is Br.

16. (Original) The process of Claim 15 wherein step (a) is carried out using SF_5Br as the reactant and a free radical initiator is used to catalyze the reaction of SF_5Br with the compounds represented by the structures K or L.

17. (Original) The process of Claim 16 wherein the free radical initiator is triethyl borane.

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18. (Original) The process of Claim 16 wherein C and D are formed by effecting dehydrohalogenation of compounds represented by the structures K and L by reaction with powdered sodium hydroxide.